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09/412,408	10/05/1999	Kevin Foley	3524.4	9618

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EXAMINER

HEWITT II, CALVIN L

ART UNIT

PAPER NUMBER

3621

DATE MAILED: 07/22/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

09/412,408

Applicant(s)

FOLEY ET AL.

Examiner

Calvin L Hewitt II

Art Unit

3621

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 17 June 2003.
- 2a) ☒ This action is FINAL. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-29 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-29 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.  
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

### Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All b) ☐ Some \* c) ☐ None of:  
1. ☐ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
\* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).  
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

### Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_ 6) ☐ Other: \_\_\_\_\_

**Status of Claims**

1. Claims 1-29 have been examined.

**Response to Arguments**

2. **112 rejection**

The Examiner maintains the 112 rejection because the Applicant's use of the term "indication of interest" (Specification, page 17, lines 18-21) is clearly contrary to the term, as it would be understood by one of ordinary skill.

**Claims 1-8**

The Applicant is attacking the references individually, as Silverman et al. clearly teach negotiations between parties (e.g. trading up to an agreed size) (figure 2; column 7, lines 25-63), and it has been held that one cannot show nonobviousness by attacking references individually where the rejections are based on combinations of references. (*In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981); *In re Merck & Co.*, 800 F.2d 1091, 231 USPQ 375 (Fed. Cir. 1986)).

**Claims 9-15**

Regarding "hidden orders", the Applicant is ignoring the breadth of the term "hidden order" and relies on the Specification (page 3, line 24-page 4, line 6) to clarify their position. However, it has been held that an Applicant cannot

read limitations only set forth in the description into the claims for the purpose of avoiding prior art (*In re Sporck*, 155 USPQ 687 (CCPA 1967)). Further, the claim that recites "repeatedly determine" is broad enough to read on a system, such as the system of Silverman et al., that receives a continuous stream of bids, offers, orders... etc. and returns corresponding opposing offers, bids... etc..

***Claims 16-29***

What is an order? Webster's Ninth New Collegiate Dictionary defines an order as, "a commission to purchase, sell or supply goods or to perform work". Similarly, Barron's Dictionary of Finance and Investment Terms defines an order as a, "request to buy, sell, deliver, or receive goods or services which commits the issuer of the order to the terms specified" (the proper definition in light of the teachings of Silverman et al., see for example figure 2). Regarding IOI's (indicator-of-interest), the Examiner relies on Silverman et al., and not Fortsenberg et al., for such a teaching. Silverman et al. teach a user selecting users from among other users of the system to which to send an IOI in a particular stock and transmitting the IOI only when the user enters an order for the particular financial instrument (column 7, lines 25-50). Specifically, the IOI of Silverman et al. allows a party to express interest in a trading instrument with selected counterparties (column 2, lines 18-40). It also acts as an "order", as it receives buy/sell responses from counterparties seeking to fulfill said order (figure 2; column 4, lines 4-12). Further evidence that the IOI of Silverman et al.

also serves as an order can be found in the fact that order parameters such as price, size and dates can be made "firm", and non-negotiable, while counterparty credit ranking can be negotiable (column 5, lines 1-7; column 7, lines 25-30; column 12, lines 18-36), and like the IOIs of Silverman, orders do not have to be completed (e.g. "soft" orders, cancellations). Therefore, the expression-of-interest, or IOI, (column 2, lines 27-30), as taught by Silverman et al., is both an indication of interest and an order (note: the claims as they are written do not exclude such a possibility). Finally, the condition of IOIs only being transmitted when the user enters an order for a particular stock is met since each IOI, or expression of interest, as taught by Silverman et al. is an order, or at least a potential order. While Silverman et al. broadly apply their system to financial instruments, it would have been obvious to one of ordinary skill to use the system to trade stocks as are financial instruments. McCausland et al. provide a list of financial instruments (column 14, lines 1-20).

The Examiner maintains the rejection.

### ***Claim Rejections - 35 USC § 112***

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. Claims 16-29 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

While applicant may be his or her own lexicographer, a term in a claim may not be given a meaning repugnant to the usual meaning of that term. See *In re Hill*, 161 F.2d 367, 73 USPQ 482 (CCPA 1947).

Barron's Dictionary of Finance and Investment Terms defines an "indication of interest" as an indication of a dealer's or investor's interest in purchasing securities that are still in registration with the SEC. Further, an IOI, is not a commitment to buy, and represents only tentative interest in a security (see also investorwords.com). The Applicant, on the other hand, states that the IOI (Specification, page 17, lines 18-21) of claims 16-19 and 26-29, "... are fully executable and associated with the actual order" (Specification, page 20, lines 18-19), that any user of the Applicant's system seeing an IOI knows that there is a real order attached to the IOI, and the IOI, "... is not being used for fishing for orders and trades" (Specification, page 20, lines 23-25), which is contrary to its [IOI] accepted meaning.

Claims 20-24 are also rejected as they depend from claim 16.

***Claim Rejections - 35 USC § 103***

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claims 1-8 have been rejected under 35 U.S.C. 103(a) as being unpatentable over Silverman et al., U.S. Patent No. 5,924,082 in view of Tilfors et al., U.S. Patent No. 6,377,940.

Silverman et al. teach a distributed negotiated matching system where users can buy and sell securities over a plurality of markets (abstract; column 7, lines 1-34; column 12, lines 18-36) that comprises:

- user terminals or input/output devices for conducting transactions (column 6, lines 17-26)
- parties involved in the buying and selling of securities (column 3, lines 36-49 and 60-67)
- a database identifying users who have been involved in recent trading activity (column 4, lines 13-50; column 5, lines 1-7 and 48-60; column 7, lines 14-33)

- the matching of users based on specified trading parameters (column 4, lines 13-50; column 5, lines 48-60; column 11, lines 5-30)
- the creation of a subset of users and the presentation of data to all or only selected users (abstract, lines 6-17; column 8, lines 1-59)
- the display of bids and offers to users (column 8, lines 11-17)
- user selection of parties with whom to interact (column 8, lines 10-58)
- pop-up windows for conducting negotiations between parties (figure 6, item 600; column 12, lines 18-21)
- the electronic, anonymous negotiation of trade terms and conditions (column 3, lines 65-67; column 4, lines 1-3, 9-12 and 27-49)
- the electronic execution of trades only after both parties are satisfied with the negotiated transaction terms (column 5, lines 1-8)

Regarding the timing of when bids and offers are displayed, Silverman et al. teach a system that distributes bids and offers to the remote terminals of users of the system (column 4, lines 28-54), displays offers throughout the negotiating process (column 7, lines 42-49) and that bids and offers may be entered into the system at any time (column 7, lines 25-32). Therefore, it would



have been obvious to allow a user to view bids and offers throughout the transaction process in order to obtain the best price. However, Silverman et al. do not explicitly recite price discovery outside the initial trading system. Tilfors et al. teach a system that receives security orders in an initial system, automatically checks the corresponding price of the security outside the system, and allows a match only if a better match cannot be found (abstract; figures 2 and 3; column/line 1/50-2/2). In addition, Tilfors et al. teach negotiations allowing a market maker to match a price from outside the system (column 2, lines 60-67) and executing trades such that priority is given to orders from the initial system (column 3, lines 25-32). Therefore, it would have been obvious to combine the teachings of Silverman et al. and Tilfors et al. in order to provide users with an improved interface for negotiating trades and receiving financial information ('940, figure 1; '082, figures 5A-7; column/line 11/35-12/36) and to reduce or eliminate the risk of a person entering an order into an automated exchange to get a worse price than he could have gotten at another exchange ('940, column 1, lines 42-46).

7. Claims 9-15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Silverman et al., U.S. Patent No. 5,924,082 in view of Korhammer et al., U.S. Patent No. 6,278,982.

Silverman et al. teach a trading system comprising:

- matching orders and repeatedly determining matches (abstract; column/line 7/35-8/5)
- user terminals or input/output devices for conducting transactions (column 6, lines 17-26)
- pop-up windows for conducting negotiations between parties (figure 6, item 600; column 12, lines 18-21)
- the electronic, anonymous negotiation of trade terms and conditions (column 3, lines 65-67; column 4, lines 1-3, 9-12 and 27-49)
- the electronic execution of trades only after both parties are satisfied with the negotiated transaction terms (column 5, lines 1-8)

However, Silverman doesn't explicitly recite hidden orders. Korhammer et al. teach a trading system that allows users to place hidden orders (column 3, lines 62-65; column 11, lines 13-18). Therefore, it would have been obvious to one of ordinary skill to combine the systems of Silverman et al. and Korhammer et al. to allow users to place orders, such as hidden orders, across a plurality of trading systems ('982, abstract; column 3, lines 57-59)

8. Claims 16-29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Silverman et al., U.S. 5,924,082 in view of McCausland et al., U.S. 5,243,331.

As per claims 16-29, Silverman et al. teach an electronic trading system comprising:

- user terminals or input/output devices for conducting transactions (column 6, lines 17-26)
- the matching of users based on specified trading parameters (column 4, lines 13-50; column 5, lines 48-60)
- the creation of a subset of users and the presentation of data to all or only selected users (abstract, lines 6-17; column 8, lines 1-59)
- the ability to enter indicators of interest (column 2, lines 17-30; column 3, lines 55-60)
- entering IOI with offers or bids (column 7, lines 25-30)

Silverman et al., also provide a user with the ability to establish parameters for selectively interacting with other participants, offers and bids (column 7, lines 25-31), and disclose prior art trading systems that allow users to enter expressions of interest only after entering an order (column 2, lines 17-30). However, Silverman et al. do not explicitly recite transmitting an IOI with an order only if that order exceeds a threshold quantity. Ferstenberg et al. teach a trading system where a participant utilizes an electronic agent for the purposes of buying and selling commodities (column/line 3/51-4/3). The "e-agent" is programmable and electronically represents a participant's trading goals (column 3, lines 21-41;

column 14, lines 36-40). Using e-agents participants are allowed to make an opening message that establishes the bounds within which a final exchange must lie- the maximum and minimum amounts of each commodity the e-agent is prepared to buy or sell (column 12, lines 62-67; column/line 13/25-14/6; column 14, lines 45-67). As in the case of Silverman et al. ('082, abstract), Ferstenberg et al. disclose an intermediary for matching buyers and sellers (figure 1). In the Ferstenberg et al. teaching the intermediary exchanges e-agent openings, offers and counteroffers that are determined by e-agent constraints such as a maximum amount exchanged (i.e. threshold quantity) (column 15, lines 1-61; column/lines 18/6-19/54). Therefore, it would have been obvious to one of ordinary skill to program the e-agent to implement a desired trading strategy, such as "all or none" (column 19, lines 19-31) or other strategies that are based on a specified quantity, as e-agents are programmed, using rule interpreters and procedural rules, to evaluate offers, and can be tailored to meet a participant's objectives (column 14, lines 45-67). However, neither Silverman et al. nor Ferstenberg et al. utilize a specialized keypad. McCausland et al. teach a dedicated keypad for a financial trading system (abstract). The keypad has special functionalities such as "bid", "confirm", "reject" "kill" commands in order to control the exchange of data between parties (figure 3; column 7, lines 38-49; column 23, lines 1-62). The keypad also allows a user to combine keys in order execute a function such as editing an order (column 23, lines 40-57). Therefore,

it would have been obvious to one of ordinary skill of the art to combine the teachings of Silverman et al., Ferstenberg et al. and McCausland et al. in order to provide a more user-friendly interface by integrating common trading functions into the keyboard and to maximize the aggregate number of units of commodities exchanged in a fair manner that is acceptable to the participants ('071, column 3, lines 42-50; column 18, lines 5-67).

### ***Conclusion***

9. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the mailing date of this final action.

10. Any inquiry concerning this communication or earlier communications from the Examiner should be directed to Calvin Loyd Hewitt II whose telephone number is (703) 308-8057. The Examiner can normally be reached on Monday-Friday from 8:30 AM-5:00 PM.

If attempts to reach the Examiner by telephone are unsuccessful, the Examiner's supervisor, James P. Trammell, can be reached at (703) 305-9768.

Any response to this action should be mailed to:

Commissioner of Patents and Trademarks  
c/o Technology Center 2100  
Washington, D.C. 20231

or faxed to:

(703) 305-7687 (for formal communications intended for entry and after-final communications),

or:

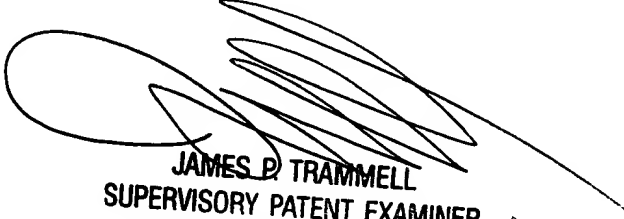
(703) 746-5532 (for informal or draft communications, please label "PROPOSED" or "DRAFT")

Hand-delivered responses should be brought to Crystal Park 5,  
2451 Crystal Drive, 7th Floor Receptionist.

Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 308-1113.

Calvin Loyd Hewitt II

July 15, 2003



JAMES P. TRAMMELL  
SUPERVISORY PATENT EXAMINER  
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